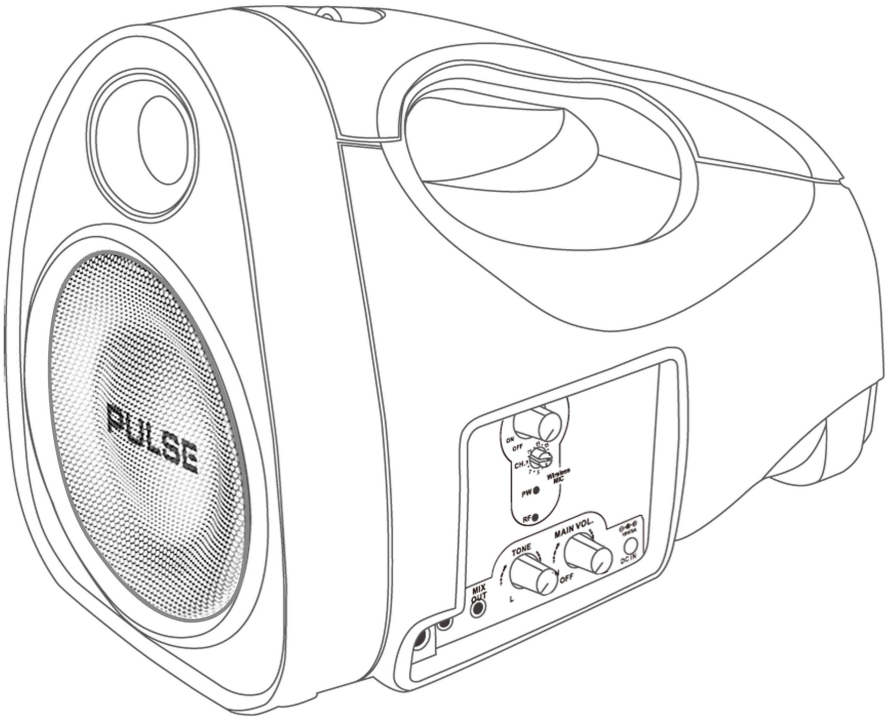
PULSE

PA-40 Portable PA System
User Instructions



RoHS conform EMC/LVD tested CE0681 R & TTE

SAVE THESE INSTRUCTIONS!!

Unpacking and Inspection

Carefully unpack the unit. If it appears damaged in any way, return it to the retailer it was purchased from in its original packaging. PULSE cannot accept any responsibility for damage arising from the use of non approved packaging.

INTRODUCTION

The PULSE PA-40 is a fully featured portable PA system, designed to provide high quality audio reproduction, reliable performance and many years of service.

MAIN FEATURES

Ultra-compact and very powerful this little PA System from PULSE will grab the attention of any crowd and ensure your message can be heard! Ideal for all uses from bingo to education, conference to outdoor events. Supplied complete with a handheld wireless microphone, internal sealed lead acid battery, shoulder carry strap and carry case.

- 40Wrms power output
- Compact & powerful
- UHF wireless receiver built-in with 16 selectable frequencies for clear, interference free wireless reception
- Up to 8 hours operation from a 4.5 hour charge
- AUX input for line level sources (e.g. Laptop or MP3)
- MIX output allows secondary units to be linked
- Master tone control
- Independent microphone and master volumes
- Mesh front panel on carry case allows operation of the unit from within carry case.
- Supplied complete with a handheld wireless microphone, internal sealed lead acid battery, switch mode charger & mains cord, shoulder carry strap and carry case.
- Optional tripod stand (PA-40 STAND) - raises the unit off the floor allowing the sound to travel further
- Optional Microphone Kit (PA-40 BP/LAV) available as a separate item contains a UHF beltpack, headset and lavalier microphones to provide a flexible system for most uses.
- Weight: 3.1kg

IMPORTANT SAFETY INSTRUCTIONS

WARNING – When using electrical products, basic precautions should always be followed, including the following:

1. Read all the SAFETY INSTRUCTIONS before using the product.
2. To reduce the risk of injury, close supervision is necessary when the product is used near children.
3. Do not use this product near water -for example, near a bathtub, washbowl, in a wet environment or near a swimming pool.
4. This product is capable of producing sound levels that could cause permanent hearing loss. DO NOT operate for a long period of time at high volume or at a level that is uncomfortable. If you experience any hearing loss or ringing in the ears, you should consult an audiologist.
5. This product should be located so that its location or position does not interfere with its proper ventilation.
6. This product should be located away from heat sources such as radiators, heat registers or other products that produce heat.
7. The product should be connected to a power supply only of the type described on the operating instructions or as marked on the product. Always ensure that a good quality mains lead is used applicable for your country. The following wiring convention is used in all product mains leads, and must be strictly observed: Green & Yellow = Earth. Brown = Live. Blue = Neutral. IMPORTANT: THIS UNIT MUST BE EARTHED!
8. If the mains fuse need replacing, DISCONNECT THE PRODUCT FROM THE MAINS SUPPLY. The fuse is located in the 13A plug of the mains cord, and must be replaced with a fuse of the type and rating stated on the rear panel. If a replacement fuse fails immediately, contact your local service agent. DO NOT replace with a higher value.
9. The power-supply cord of the product should be unplugged from the outlet when left unused for a long period of time. When unplugging the power-supply cord, DO NOT pull on the cord, but grasp it by the plug.
10. Ensure the mains isolation switch is readily accessible when the product is in use.
11. Care should be taken so that objects do not fall and liquids are not spilled into the enclosure through openings.
12. The product should be serviced by qualified service personnel when:

A. The power-supply cord or the plug has been damaged; or
B. Object have fallen, or liquid has been spilled into the product; or
C. The product has been exposed to rain; or
D. The product does not appear to operate normally or exhibits a marked change in performance; or
E. The product has been dropped or the enclosure damaged.

13. DO NOT attempt to service the product beyond that described in the user-maintenance

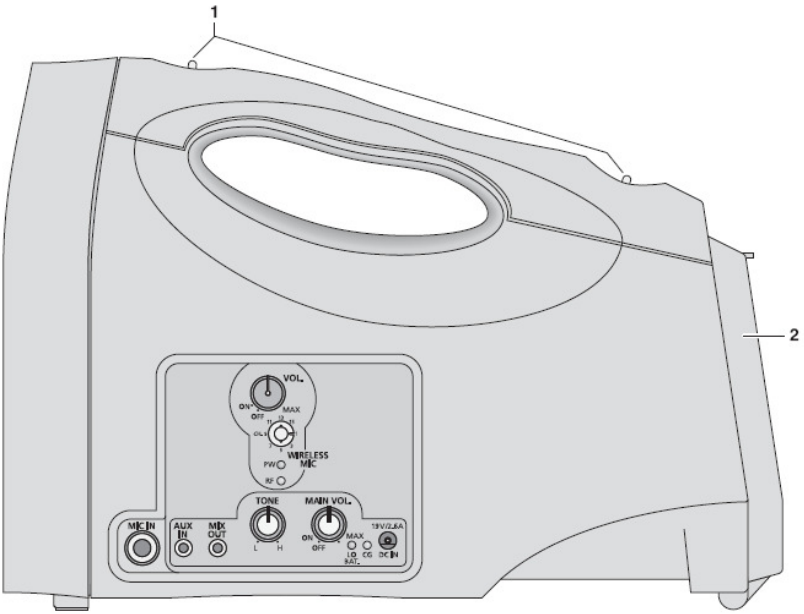
instructions. All other servicing should be referred to qualified service personnel.

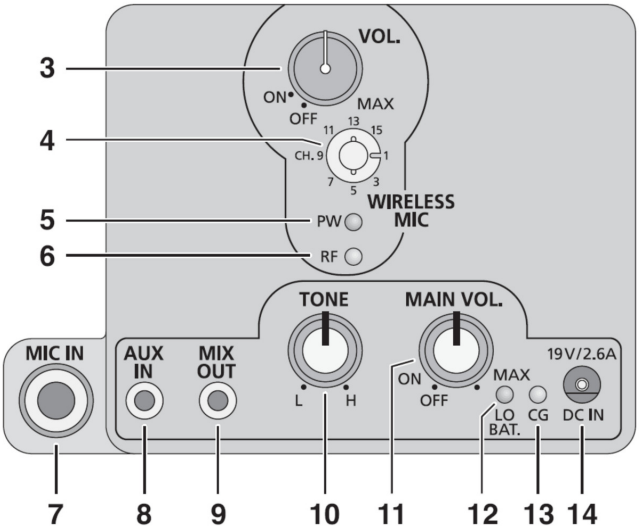
14. WARNING - DO NOT place objects on the product's power cord or place it in a position where anyone could trip over, walk on or roll anything over it. DO NOT allow the product to rest on or to be installed over power cords of any type. Improper installations of this type create the possibility of fire hazard and/or personal injury.

IF YOUR PRODUCT STOPS WORKING ;

- READ THE MANUAL !!!
- Turn volume to zero and re-adjust each control in
- Check all connections (input and output, at both ends of cable)
- Check status lights, battery charge and power connections
- Disconnect from mains before changing fuse
- Replace fuse only with same type and rating
- If problems persist contact a qualified service agent

OPERATION & CONNECTIONS





1 - Eyes for fastening the shoulder strap

2 - Cover of the battery compartment

3 - On-off switch for the corresponding receiving part and volume control for the microphone signal

4 - Channel selector switch

5 - Red power LED PW: will light up when the receiving part is switched on

6 - Green reception LED RF: will light up when a suitable transmitter is switched on and set to the radio frequency of the receiver

7 - Microphone input MIC IN (6.35 mm jack, unbalanced)

8 - Input AUX IN (3.5 mm jack, unbalanced) to connect a unit with line output, e. g. CD player, cassette recorder, MP3 Player or laptop

9 - Output MIX OUT (3.5 mm jack, unbalanced) to connect another active speaker system or an audio recorder. The output level is independent of the control MAIN VOL (11).

10 - TONE control

11 - On-off switch for the unit and control for the total volume

12 - Red LED LO BAT: will light continuously when the unit is switched on and the battery is still sufficiently charged will flash when the battery must be recharged

Applications and Accessories

The PULSE PA-40 combines a speaker system, an amplifier, and UHF wireless receiver for a wireless microphone or a pocket transmitter (handheld UHF microphone supplied). An additional microphone pack containing UHF beltpack, headset microphone and lavalier (tie clip) microphone is also available, please order “PA-40 BP/LAV” from your local PULSE dealer.

Power is supplied from a mains socket via the power supply unit provided or via the integrated rechargeable battery which allows mains-independent operation, the system has an internal charging circuit for recharging the battery.
To cover larger areas & crowds, several PULSE PA-40 systems can be set up to receive and reproduce the signal of one single wireless microphone. To do this set all units to the same UHF frequency and adjust volume controls accordingly. It is also possible to connect the PA-40 to external powered speaker systems via the audio output MIX OUT.
The system is supplied with a practical shoulder bag and a shoulder strap.

4 Operating the System

4.1 Power supply/recharging the battery

1) For operating the active speaker system via a mains socket and/or for recharging the internal battery, connect the power supply unit supplied to the jack DC IN (14) and connect it via the mains cable supplied to a mains socket (100 – 240 V~/50 – 60Hz). If the power supply unit is connected to the mains socket, the green power LED will light up on the power supply unit.
2) As soon as the power supply unit supplies power to the active speaker system, the battery will be recharged: The green charging LED CG (13) will flash. For charging, it is not necessary to switch on the unit with the switch and volume control MAIN VOL (11), however, the unit can be used as usual during the charging process.
3) When the battery has been fully charged, the charging LED CG will light continuously. In this case, a mains-independent operating time of approx. 3 hours at maximum volume will be possible, if used at lower volumes run times of up to 8 hours can be achieved.
4) The battery should be recharged when the red LED LO BAT (12) starts flashing while the unit is switched on.
5) After operating or after recharging the battery, disconnect the power supply unit from the mains socket to prevent unnecessary power consumption.

Notes

1. If the active speaker system is not used for a longer period, the battery should be fully recharged every 2 – 3 weeks to ensure a long battery life.
2. As the rechargeable battery is subject to normal aging, the battery is classed as a consumable item and covered by a 90 day warranty from point of sale.
3. The charging circuit is matched to the type of integrated rechargeable battery. Replace a defective battery by one of the same type only – see specifications! Failure to do so will result in damage to the unit and the battery.

4.2 Positioning & Transporting

For optimum setup the system is best mounted on a stand at a height of 1 – 1.5 m above the ground. An optional stand "PA-40 STAND" can be purchased from your local PULSE dealer.

For mobile use, e. g. guided tours or outdoor events, the shoulder strap or the shoulder bag supplied can be used. Fasten the strap to the eyes (1). For operation inside the shoulder bag, put the active speaker system into the bag in such a way that the sound from the speaker will be radiated through the mesh side. To access the operating elements and connections, open the lateral flap of the bag (Velcro fastener).

4.3 Connections for Microphones & Audio Sources

Always switch off the active speaker system before connecting!

1) In addition to the wireless microphone, a cable connected microphone may be used. Connect the microphone to the jack MIC IN (7).

2) Audio units with a line output (e. g. CD player, cassette recorder, MP3 player or laptop) can be connected to the jack AUX IN (8). A cable-connected microphone and an audio unit should only be connected at the same time if the output level can be adjusted on the audio unit; otherwise the volume ratio between the microphone and the audio unit cannot be altered.

3) For sound recordings, connect a recorder to the jack MIX OUT (9). The output level is independent of the position of the control MAIN VOL (11).

4) For PA applications of larger zones, connect an additional PULSE PA-40 to the jack MIX OUT (9). More units can then be daisy chained from the mix out of the second unit etc.

5 Operation

1) Switch on the unit with the on-off switch and volume control MAIN VOL (11). During operation, the red LED LO BAT (12) will light up. If it the light flashes, recharge the battery as per chapter 4.1.

2) If a microphone is connected to the jack MIC IN (7) or a unit to the jack AUX IN (8), adjust the desired volume with the control MAIN VOL.

3) If a wireless microphone or a beltpack transmitter is used, switch on the receiver with the on/off switch and volume control VOL (3). The red LED PW (5) will light up.

4) Leave the wireless microphone or the pocket transmitter switched off for the time being and use the rotary switch (4) to select a channel which is free and interference-free.

If the green LED RF (6) lights up after the channel has been selected and with the microphone or transmitter still switched off, interference or signals of other transmitters are received on this channel. In this case, set the receiver to a different channel.

5) Switch on the wireless microphone or the pocket transmitter and set it to the same channel as the receiver. The green LED RF (6) will light up to indicate reception of a radio signal.

6) If a microphone is connected to the jack MIC IN (7) or a unit to the jack AUX IN (8), use the control VOL (3) to add the microphone signal received. If the wireless microphone or the pocket transmitter is

used on its own, advance the control VOL (3) to approx. 2/3 and adjust the volume with the control MAIN VOL (11).

7) Adjust the sound with the TONE control (10).

Specifications	
Output Power	50W Max . 40Wrms
RF Frequency	863-865MHz, 16 Channels
RF Range	approx. 30m
Input Sensitivity	
Microphone (MIC IN)	10mV
Line input (AUX IN)	100mV
Output (MIX OUT)	560mV
Audio Frequency	60Hz-15kHz, ±3 dB
Tone Control	±8 dB/10 kHz
Power supply	12 V/2.9 Ah or power supply unit supplied
Input voltage	100 – 240 V~/50 – 60Hz/180 VA
Dimensions	160 × 210 × 290mm
Weight	4.2kg

Received frequencies			
Channel	Frequency	Channel	Frequency
1	863.050 MHz	9	864.050 MHz
2	863.175 MHz	10	864.175 MHz
3	863.300 MHz	11	864.300 MHz
4	863.425 MHz	12	864.425 MHz
5	863.550 MHz	13	864.550 MHz
6	863.675 MHz	14	864.675 MHz
7	863.800 MHz	15	864.800 MHz
8	863.925 MHz	16	864.925 MHz

Service

All PULSE products are thoroughly examined and tested before leaving the factory, and if used correctly will give many years of excellent service. However, if a problem arises, proceed as follows:

A) Contact the retailer from whom the unit was purchased and describe the symptoms of the fault.

B) If the retailer cannot help, return the equipment to the national distributor for your country. Use the original packaging to protect the product from damage. Include a note with the equipment stating your name and address, details of the problem, date code and date and place of purchase.

The unit does not contain any user serviceable parts. For details of spares, accessories and other products, contact you local retailer. In the event of any difficulty contact PULSE directly via www.pulse-audio.co.uk